Orbizal

Minotaur IV

Space Launch Vehicle (PK SLV)

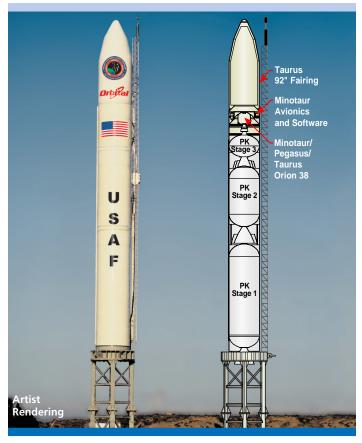
The Minotaur IV leverages flight-proven Minotaur, Pegasus®, and Taurus® space launch vehicle subsystems to provide an extremely cost-effective and capable space launch vehicle. Orbital provides the Minotaur IV Space Lift Vehicle (SLV) under 10-year Orbital/Suborbital Program 2 (OSP-2) contract with the U.S. Air Force Space and Missile Systems Center (SMC).

Three government-furnished Peacekeeper solid rocket stages along with a commercial Orion 38 provide an unmatched mix of value and performance. The combination of decommissioned ICBMs with commercial boosters and hardware is one of Orbital's strengths, as demonstrated with the use of the Peacekeeper Stage 1 motor on Taurus and the first two stages of Minuteman II on the OSP Minotaur SLV.

For the Minotaur IV SLV, the OSP standard avionics and attitude control subsystems are integrated into a 92 in. diameter Guidance Control Assembly (GCA) which also includes the Stage 4 Orion 38 motor. The avionics and flight software are common with our OSP Minotaur SLV and Target Launch Vehicle, while the Attitude Control System (ACS) tanks and cold-gas thrusters are existing, flight-proven Taurus designs.



Flight-proven Taurus 92" Fairing



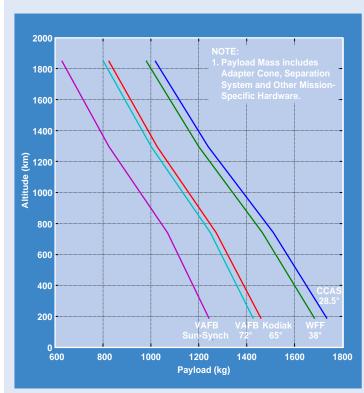
OSP-2 Peackeeper SLV

Features:

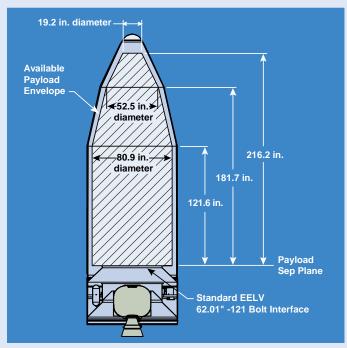
- Inertially guided 4 stage solid rocket propulsion
- Uses flight-proven hardware with demonstrated success record (Minotaur/Pegasus/Taurus)
- Full payload support including power, telemetry, sequencing, deployment, attitude control and recovery
- Portable ground support systems
- 18 month mission response including payload integration and launch by Orbital's experienced launch crews
- Multiple spaceport launch capability (California, Florida, Alaska, Virginia)

Performance:

- System performance assured from 50+ PK Launches
- Adaptable to a variety of single or multiple payload missions
- 1735 kg to LEO (185km, 28.5 deg inclination)
- Available optional enhancements include:
 - Insertion accuracy of <10 nm (3s) inclinations <0.05 deg (3s)
 - Conditioned air (Class 10K), temperature and humidity control and nitrogen purge
 - Full spacecraft isolation and multiple payload adapters



Minotaur IV Payload Capability



Standard 92" Fairing Envelope

Payload Accommodations:

- Standard Taurus 92 in. Fairing supports dedicated or shared launch missions
- Thermally controlled fairing with Class 100K standard cleanliness
- Standard 62.01 in. (1575 mm) bolted interface with optional payload adapters and separation systems
 - 38.8 in. flight-proven SAAB system option
 - Other sizes between 62.01 in. and 17 in. available to support unique mission requirements
- Payload access provided by 18 in. x 24 in. doors positioned on fairing cylindrical section at user-specified locations
 - Additional payload access panels



Point of Contact:

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